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ABSTRACT

The present invention provides a method (100), access point (20) and program product (35) for providing airtime and bandwidth fairness in wireless networks. To provide bandwidth fairness, a more fragment bit is set in a set of packets (46C) received by an access point (20) so that the packets of the set of packets (46C) can be transmitted to its destination (46C) successively (i.e., without back-off). To provide airtime fairness, upon receiving a packet (34) destined for a wireless station (22A), the access point (20) will calculate an airtime requirement for transmitting the packet (34), set a time counter (50) based on the airtime requirement. Thereafter, it will be determined whether the packet (34) can be transmitted to wireless station 22A before the time counter (50) expires. If not, transmission of the packet (34) will either not occur, or the packet (34) will be split into a set of fragments (48) for transmission.